

FAQ #1: Frequently Asked Questions About Rose Culture

by Albert Ford

(adapted from the March-April, 2000 MRS Newsletter)

In early March, a gardener's thoughts are less dreams of the perfect garden and more of the practical questions of how to proceed with anticipated tasks when they can finally get to their gardens for early activities. Growers of roses, at this time of year have many questions, some of which tend to recur year after year and therefore are addressed below.

1. When should I remove the winter protection material that I used on my roses this past winter?

The primary consideration is not to remove winter protection material too soon. If there are warm days in March, especially if some new growth is present on our plants, the tendency is to remove the material we have used to protect our plants during the winter. The danger, of course, is that without this protection, a late, unexpected cold spell, especially one attended by cold winds, can do irreparable damage to the plants. There are those who believe that a greater percentage of "over-winter mortality incidents" result from premature removal of winter protection than from the ravages of the entire winter.

Remember that spring does not officially begin until after mid-March ; therefore, you should be looking at a time after that date, when there is reasonable probability that your roses will still be protected in the event of a very cold and windy turn in the weather. Even though the frost date in this part of Maryland does not occur until about May 10th, I have found that early April (the first two weeks) is generally the right time.

One other word of caution involves how you remove the material. Special care should be exercised. It should be removed gradually over a period of a week or ten days, being careful not to break off any new growth from the crown which, if undisturbed, will develop into a new cane/s that will bear foliage and subsequent blooms. As the canes mature, you may wish to protect them further by a stake and a soft tie of some sort. A piece of a old nylon stocking is perfect for this purpose. Soft twine can be used also.

2. When do I prune my rose bushes and how is pruning accomplished?

You will find that most rosarians in this area prune after the middle of March but before the end of the month. I generally strive to have all pruning and fertilizing of my roses accomplished by April 15th.

Here are three suggestions for those readers who would like to know more about pruning. First, attend the March meeting of the Society, when the discussion will be on pruning. A handout will be given to all attendees that will cover the recommended pruning practices for all types of roses. Second, plan to attend the pruning demonstration at Broadmead in late March or April. The activity at Broadmead is especially oriented to accommodate those new members who wish to learn more about pruning. Lastly, any of the Society's Consulting Rosarians will be glad to answer your pruning questions. Their names and phone numbers appear on the cover of each issue of the MRS Newsletter.

3. I plan to use a lime-sulfur spray this year to get a head start on the control of blackspot and mildew. When should I spray?

As your Editor wrote in the MRS newsletter in 1991,

"In 1990, your Editor had more blackspot than usual and decided to use a dormant spray between growing seasons to help control these diseases. Lou Roth, a Consulting Rosarian and fine exhibitor of roses, advised me that he used Ortho's Orthorix Spray, a Lime-Sulfur Fungicide. His normal formula involves spraying in winter when the roses are completely dormant with a solution of 5 tablespoons of Orthorix Lime-Sulfur and 5 tablespoons of Volck Emulsified Oil to a gallon of water. He follows up in late winter or early spring with a repeat spray of one tablespoon to a gallon of water of Orthorix only. The spray should be applied to canes, crown and the soil or mulch around the plant. I followed this prescription for Orthorix only in the winter of 1990-91 and early spring 1991. It was my observation that blackspot and powdery mildew were minimal in 1991 and were easily controlled during the growing season with my normal spray program."

It is not too late (late Feb.- early March) for a spring application of lime-sulfur, provided the plant has not started to leaf out. I would be inclined to use a mixture of two tablespoons per gallon of water and would look for a three-day period where the temperature will be no higher than 60 F. The canes, crown and area around the plant should be covered. I would not recommend using lime-sulfur in warmer temperatures or when there is evidence that the buds are beginning to break and mature into new foliage. Lime-sulfur can be used--with great caution--after the buds have begun to swell and leaves are showing, but I would not recommend it at that time for the first time user.

If, during this year, blackspot and mildew are particularly bothersome, you might give some thought to using lime-sulfur in the stronger solution next winter when your roses are completely dormant.

4. I've heard of bare root roses. Where do I get them and how are they planted?

You have probably purchased your rose plants from a nursery where they are sold in containers. In this area, Watson's, Southern States and Valley View are three such nurseries. Such roses are generally of good quality and do well when planted in the garden. Should you purchase plants from a catalog, however, they will arrive in an air tight plastic package, with peat moss or other material to aid in the retention of moisture, but they will be bare rooted, meaning that they are not in soil and must be planted within a short time after the package is opened for examination.

Bare root roses can also be obtained from Carroll Gardens in Westminster, which usually has a good selection. The roses will be from Week's Nursery and are of good quality.

If you order or buy bare root plants, the soil where you intend to put the plants should be prepared in advance, if possible, and the planting mixture allowed to settle, before the plants arrive. For the larger roses-- Hybrid Teas, Floribundas and Grandifloras--the hole should be at least 18 inches

deep and 18 inches across. Some rosarians prefer 24"x 24" inch holes. The material removed from the hole should be combined with compost or peat moss, and good top soil. My basic soil is mostly clay which I remove and sift through a ½ inch wire mesh screen. I place compost in the bottom of the hole mixed with a cupful of superphosphate and fill the rest of the hole with a mixture of the sifted clay, compost, sand and good top soil. The proportions may vary somewhat, but generally one-sixth clay, one-sixth sand, one-third composted material (from leaves, grass, table scraps, etc.) and one-third top soil purchased by the bag.

This material is mixed thoroughly in a wheelbarrow to which I add one cup each of superphosphate, dolomitic limestone and several cups of gypsum. The gypsum is mixed with the sifted clay before the other ingredients are added. No general fertilizer is added at this time, as nitrogen is particularly harmful to new root growth.

This mixed material is placed in the hole and allowed to pack down. Usually I do this work in the fall in anticipation of roses arriving in late November or in early spring; however, at times advanced preparation is not possible, so I go through this while the new bare root rose is waiting patiently in the basement.

Before planting, the bare root plant is immersed in a thirty-gallon container filled with warm water to enable the plant to absorb moisture. The length of time of soaking will depend on the condition of the plant when received. The minimum time is several hours to overnight, if the plant appeared dry when the package was opened.

Most nurseries provide bare root planting instructions with each purchase. These should be followed carefully for best results. Generally, they include removing some of the soil from the hole and creating a mound of more of the soil in the hole such that the plant can be placed over the mound in a natural way, snugly against the top of the mound. The depth of the mound is such that the crown of the plant (the part where the canes have been grafted or where canes emerge in own-root roses), will be even with the soil surrounding the hole. In colder climates, the crown is planted somewhat below the surface. I have found that sometimes the crown will settle below the surface a little but no harm will come to the plant unless the depth of the crown is several inches deep.

The balance of the material is placed around the plant and compacted gently with hands or feet. Before the hole is filled, water should be placed in the hole to assist in compacting. Finally, the hole is filled and a mound of eight inches is created around the crown and above the surrounding soil level. The idea is to keep the crown moist and protected from drying winds until the root system is reasonably established. After two weeks, this mounded material may begin to be removed. It should not be removed all at once, but over a period of several days.

It is also a good idea to prune broken roots before planting and to prune the canes after planting to a height of approximately 8 to 10 inches, making each pruning cut to the closest outside bud-eye to encourage growth in an urn shape, without growth to the interior of the plant which restricts good air flow and disturbs the appearance of the bush.

5. What about spraying my roses? When do I start, how often do I spray them and what do I use?

Generally, the earlier in the year that you start your spray program, the better. Certainly the start should occur by the time the canes have begun to leaf out. Your spraying should occur every seven to ten days and should continue throughout the growing season (in Maryland, November). Too

often a rose grower and exhibitor of roses will ease-off or suspend spraying after the last rose shows of the year have occurred, about the middle of September. If conditions are warm and moist, it is startling how quickly blackspot or mildew can appear when two to three weeks pass without spraying. Once it gets established, it is very difficult to get under control again.

There is a wide choice of spray materials available. To the new rose grower, it is recommended they use a product which has stood the test of time rather than experimenting with a new or novel product or mixture. The Ortho products--Funginex, for blackspot and powdery mildew and Orthene, to combat sucking insects--are good and are much in use today. The user should apply these products, or any other, strictly in accordance with the manufacturer's suggestions, which would include protection to one's self and environment.

The two products mentioned, Funginex and Orthene, can be mixed and sprayed together. An increased number of rosarians restrict the use of a insecticide such as Orthene to those few occasions where the insects are out of control. A good rule is to control insects with the least toxic material available. Aphids, for example can be controlled with a strong stream of water, a soap product, or you may wish to try Beth Kerr's organic, onion-garlic mixture as (presented in the Jan-Feb, 2000, MRS Newsletter, page 6).

BETH KERR'S APHID CONTROL FORMULA

Ingredients: 1 small sliced onion
1 tablespoon fresh minced garlic

Process: Place in 1 gallon milk jug. Fill with hot water. Let stand for 24 hours. Pour enough of mixture to fill a spray bottle.

Application: Mist all new growth. Mixture will keep aphids away and will kill pests already on the leaves.

In my opinion, an effective organic fungicide product is not yet on the market, although I have no doubt it will be available ultimately, because of the intense interest of gardeners in employing less hazardous materials to control garden pests. In this context, if you have tried an organic fungicide which gives a reasonable protection against blackspot and mildew, please let your Editor know about it.

It is a good idea to alternate the type of fungicide one uses to control blackspot and powdery mildew. Although there doesn't appear to be experimental evidence available, a number of writers have noted that a fungus can acclimate to a regular diet of one specific kind of pesticide, and that the continuous use of a single fungicide becomes less and less effective. Due to this reasoning, some rosarians switch off to a second fungicide every other spray or periodically. An alternative to Funginex might be Daconil 2787.

Some thoughts to keep in mind while spraying:

1. If you have not done so already, before you spray take the time to clean up fallen leaves from last year and strip any leaves still clinging to the canes from last year. If you mulched your roses over the winter, there probably will be some foliage from last year under the mulch. When the winter mulch is pulled back, any dead foliage seen should be removed and the ground area around the plant and the mulch sprayed.
2. Add a spreader-sticker to your spray solution. It will provide more even coverage of the foliage and

will keep the spray material in contact with the leaf surface longer. Some rosarians also add a teaspoon of white vinegar to the spray material on the assumption that it acts as a catalyst to other spray materials and makes them act quicker or more effectively.

3. Spray the undersides of the foliage as well as the tops. Also spray the canes which can harbor the fungus spores. Although the blackspot spores can become airborne, they are generally spread by water that strikes contaminated old foliage on the ground and splashes onto the lower foliage. This explains why blackspot seems to begin on the lower foliage and why these lower leaves will turn yellow earlier, and ultimately fall to the ground.
4. Do not spray when it is windy and the spray material might get on your skin or clothing or drift onto your neighbors' property.
5. Keep all spray material out of the reach of children, tightly sealed and in a shaded area when not in use.
6. Clean your spray tank immediately after spraying with dishwashing soap and water, and rinse well by running clear water through the spray system.
7. Wear protective clothing, eye protection and a mask while spraying, especially with highly toxic materials.

6. If I am replacing a rose that died over the winter, can I use the same soil for the new rose or should it be replaced?

It is often tempting to use the same soil in a rose bed when a plant has not made it through the winter and must be replaced. Some gardeners do just that as a matter of course and later wonder why the replacement doesn't measure up to the advertising literature. The following from "Roses, The Cultivation of The Rose," published by The National Rose Society, comments on the question of soil replacement.

"Disappointment is often caused by planting rose trees (plants) in old rose beds, in which they frequently fail to thrive. One of the first things is to see that the new plant has fresh soil in which to start life. To plant roses in old rose beds, filling up gaps here and there where old plants have died, is a mistake which is not infrequently made. New plants will not grow well and thrive in this old rose soil. A rose bed that has grown roses for ten years or more may be quite exhausted as far as roses are concerned; it is 'rose sick', although some of the old plants will go on growing for many more years, because their extensive root systems are ever pushing forth to new areas. If there are many gaps in this old rose bed, it is far better to take up the best of the old plants, discard the old ones and make a new bed in fresh soil which has not grown roses for a number of years. The old bed should then be used for other crops, or, better still, put to 'green manuring' for one or two years. If this is impossible and the site cannot be spared or is the only one available, then it is advisable to take out for each new plant at least twelve inches deep and eighteen inches square of the old soil and exchange it for soil from another part of the garden which has not previously grown roses."

A follow-up question might reasonably be, how long does it take for a rose bed to become unhealthy for new roses? A rose planted last year in a new soil mixture which did not make it through its first winter may be replaced in the same soil mixture. After a couple of years, however, it is a good idea

to amend the soil to be used with the new rose in some manner. Usually, I use part of the old soil mixture and some new top soil, compost and peat moss. If I have had a lack of success with a specific area of a rose bed, i.e. two or more prior roses have fared poorly in that location, I would look for a cause, and would replace the soil mixture completely. Soil that is removed can be used safely in other parts of the garden, but not in another rose bed.

It is possible to have your soil tested for adequacy of growing roses. The University of Maryland has soil testing service. Call 1-800-342-2507, Monday through Friday, from 8 a.m. to 1 p.m.. to inquire about their soil testing program.

7. What is the best time to have bare root roses delivered in this area for planting?

If you are ordering roses for this spring, it is suggested that you ask for them to be delivered in the last week in March or the first week in April. At that time the soil is workable and the weather is sufficiently tolerable to get the job done.

Bare root roses will arrive inclosed in plastic with some type of moist material, peat moss, shredded newspaper, etc. The cardboard box should be placed in a cool area, such as an unheated garage or basement, until you are ready to work with the roses, in the next few days. If it will be more than a few days before you can plant them, the plants should be checked for moisture by opening the plastic bag, moistening with a spray if necessary, and closing and securing the container. Roses can be kept for a week or so before planting as long as they remain moist.

The rose bed or hole where you intend to place a specific rose should have been prepared in the fall or, in any event, needs be prepared before the rose is readied for planting. Getting it ready for planting would include opening the package, removing the plant and placing it in water for a period of time. Some rosarians prefer to soak the bare root plant in water overnight; a few hours is sufficient unless the plant is dry. Before taking it into the garden, check for broken roots and prune them where necessary. Remove any white or pinkish growth which may have occurred, and take the plant to the garden in a pail of water.

Plant the rose in accordance with the instructions from the nursery that supplied it and water-in well. Be sure you remove any air pockets in the soil by gently tamping and mounding soil above the crown of the rose to protect it from drying wind until the plant has begun to leaf out. Lastly, remove the identification metal or plastic tags and prune the canes to approximately 8 inches, cutting just above an outside bud eye where possible. It is a good idea to paint the pruning cut with Elmer's Carpenter's Wood Glue, shellac, or whatever you normally use to seal the ends of pruned canes.

Keep the soil around the newly planted rose moist but not soaked. The new plant will first begin to establish a root system by producing many white hair roots before it begins to produce growth above the ground in the form of leaflets.